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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/648,590	08/25/2003	Ricky W. Purcell	1443.053US1	4252

21186 7590 10/19/2006

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EXAMINER

ROANE, AARON F

ART UNIT PAPER NUMBER

3739

DATE MAILED: 10/19/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>		<b>Applicant(s)</b>	
	10/648,590		PURCELL ET AL.	
	<b>Examiner</b>		<b>Art Unit</b>	
	Aaron Roane		3739	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 27 April 2006.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 6, 7, 10-12, 14-16, 29-31, 34 and 36 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 6, 7, 10-12, 14-16, 29-31, 34 and 36 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                     | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |

## DETAILED ACTION

### *Claim Rejections - 35 USC § 103*

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 6, 7, 10-12, 14-16, 29-31, 33 and 36 are rejected under 35 U.S.C. 103(a) as being unpatentable over Dunshee et al. (USPN 4,462,224) in view of Sabin (USPN 6,099,555) in view of Avery (USPN 5,486,206).

Regarding claims 6 and 12, Dunshee et al. disclose a hot/cold pack comprising: an enclosure (10); a solute within said enclosure (21), a liquid within said enclosure (19); a membrane segregating said liquid from said solute (24 of the group of 24 and 26), wherein rupturing said membrane mixes said liquid with said solute to produce an endothermic solution within said enclosure; and an absorbent core (23) within said enclosure, said membrane (26 of the group of 24 and 26) segregating said absorbent core from said solute, see col. 2, lines 26-58, col. 3, line 18 through col. 5, line 65 and figures 1-7, particularly figures 1-3. Dunshee et al. fail to disclose that the endothermic solution

is spread through the absorbent core and that the absorbent core is formed at least partially of a fibrous material. Sabin discloses a cold pack (1) comprising: an enclosure (entire outer covering consisting of 2 and 2a), a powdered solute (24) within said enclosure; a liquid (28) within said enclosure, a membrane (portion of 2 and 2a located at 7) segregating said liquid from said powdered solute, wherein rupturing said membrane mixes said liquid with said powdered solute to produce an endothermic solution within said enclosure, and an absorbent core (26 of 8) within said enclosure, said absorbent core retaining said endothermic solution to spread said endothermic solution throughout said enclosure. Sabin further discloses that the absorbent core (26 of 8) is an absorbent layer. Finally, Sabin discloses solute is interspersed throughout said absorbent layer before said membrane is ruptured, see col. 1-11, particularly col. 10, lines 2-24 and figures 2 and 3. Additionally, it should be noted that the mixture of 24, 26 and 28 forms a gel, since 26 is a gelling agent. Additionally, Sabin teaches that the liquid, solute and gelling agent can all be mixed together such that the mixture is an endothermic gel. Avery discloses a therapeutic thermal device comprising a gel (20) and teaches providing the gel with a fibrous material (e.g., 66) in order to increase gel viscosity and heat capacity, see abstract, col. 1-6 and figures 1-5. Therefore at the time of the invention it would have been obvious to one of ordinary skill in the art to modify the invention of Dunshee et al., as taught by Sabin, to mix the liquid (solvent), solute and gelling agent together as an alternate cooling modality and in order to provide a relatively conformable cooling device, and as further taught by Avery, to provide the gel with a fibrous material in order to increase gel viscosity and heat capacity.

Regarding claims 7, 10, 11, 14-16, 31 and 33, Dunshee et al. in view of Sabin in further view of Avery disclose the claimed invention.

Regarding claim 29, 30 and 36, Dunshee et al. disclose the claimed invention, see col. 5, lines 4 and 19.

Regarding claim 34, Dunshee et al. in view of Sabin in further view of Avery disclose the claimed invention.

### ***Response to Arguments***

Applicant's arguments filed 4/27/2006 have been fully considered but they are not persuasive. Applicant asserts on page 6, last paragraph that "(i) Dunshee, Sabin and Avery do not disclose either singularly, or in combination, the invention as claimed in claims 6, 7, 10-12, 15-16, 29-31, 34 and 36; (ii) the Examiner has not provided an adequate motivation to combine Dunshee, Sabin and Avery; and (iii) Avery teaches away from any combination with Sabin and Dunshee." The examiner will address each argument/remark in turn.

First in response to section I on pages 8 and 9, the examiner can only disagree that each and every element of the claimed invention is accounted for and that as a whole Dunshee, Sabin and Avery disclose an enclosure, a solute, a liquid, a membrane and a fibrous layer as is detailed

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in the above rejection and supported by noted passages from the prior art. As claimed the present invention is fully met by the prior art of record.

Secondly in response to section II on pages 9 and 10, as to the provision of adequate motivation to combine Dunshee, Sabin and Avery, the above rejection is made via a combination of prior art within a single subclass, having many common structural features and the motivation is stated explicitly within the rejection. Sabin is used to teach the provision of mixing the gelling agent, solute and solvent initially, while Avery teaches adding (pulp) fibers to the gel mixture in order to increase gel viscosity and heat capacity. The test for obviousness is not whether the features of a secondary reference may be bodily incorporated into the structure of the primary reference; nor is it that the claimed invention must be expressly suggested in any one or all of the references. Rather, the test is what the combined teachings of the references would have suggested to those of ordinary skill in the art. In re Keller, 642 F. 2d 413, 425, 208 USPQ 871, 881 (CCPA 1981). In this regard, a conclusion of obviousness may be based on common knowledge and common sense of the person of ordinary skill in the art without any specific hint or suggestion in a particular reference. In re Bozek, 416 F. 2d 1385, 1390, 163 USPQ 545, 549 (CCPA 1969).

Thirdly in response to section III on page 10, Avery is simply used to teach the addition of pulp fiber material in a thermal gel in order to increase gel viscosity and heat capacity. Additionally, Dunshee et al. also teach a one-time use and multiple use modalities, see col. 2. In response to applicant's arguments against the references individually, one cannot show nonobviousness by attacking references individually where the rejections are based on

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combinations of references. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981); *In re Merck & Co.*, 800 F.2d 1091, 231 USPQ 375 (Fed. Cir. 1986).

**This action is made FINAL.**

### ***Conclusion***

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Aaron Roane whose telephone number is (571) 272-4771. The examiner can normally be reached on Monday-Thursday 7AM-6PM.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Linda Dvorak can be reached on (571) 272-4764. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

A.R. *A.R.*  
October 14, 2006

*Roy D. Gibson*  
ROY D. GIBSON  
PRIMARY EXAMINER